

Appl. No. 10/623,479  
Amdt. dated June 13, 2006  
Reply to Office Action of December 13, 2005

PATENT

**Amendments to the Claims:**

This listing of claims will replace all prior versions, and listings of claims in the application:

**Listing of Claims:**

- 1                   1.       (Currently Amended) A system for loading configuration data into a  
2 programmable device, the system comprising:  
3                   a configuration word register comprising a plurality of configuration blocks;  
4                   a plurality of configuration inputs selectively coupled with each of the plurality of  
5 configuration blocks and adapted to communicate configuration data; and  
6                   a plurality of command inputs adapted to independently enable loading of at least  
7 one of the plurality of configuration blocks, wherein the plurality of configuration blocks are  
8 adapted to simultaneously load configuration data via the plurality of configuration inputs in  
9 response to the plurality of command inputs.
- 1                   2.       (Original)     The system of claim 1, wherein each of the plurality of  
2 configuration blocks is coupled with one of the plurality of command inputs.
- 1                   3.       (Original)     The system of claim 1, wherein at least one configuration  
2 block comprises a plurality of bits equal in number to the number of configuration inputs.
- 1                   4.       (Original)     The system of claim 3, wherein at least one configuration  
2 block comprises one or more bits, such that the total number of bits is less than the number of  
3 configuration inputs.

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1                   5.       (Original)     The system of claim 1, further comprising:  
2                   a configuration memory having a plurality of memory locations and coupled with  
3 the configuration word register, wherein the configuration memory is adapted to load  
4 configuration data from the configuration word register.

1                   6.       (Original)     The system of claim 1, further comprising:  
2                   a configuration mode input; and  
3                   a configuration controller coupled with the configuration mode input, wherein, in  
4 response to a first state of the configuration mode input, the configuration controller is adapted to  
5 enable the plurality of configuration blocks to simultaneously load configuration data via the  
6 plurality of configuration inputs in response to the plurality of command inputs, and, in response  
7 to a second state of the configuration mode input, the configuration controller is adapted to  
8 enable loading of configuration data into the configuration word register via an alternate  
9 coupling with configuration data.

1                   7.       (Original)     The system of claim 6, wherein the alternate coupling with  
2 configuration data is via the plurality of configuration inputs.

1                   8.       (Original)     The system of claim 6, wherein the alternate coupling with  
2 configuration data is via the plurality of command inputs.

1                   9.       (Original)     The system of claim 6, wherein the alternate coupling with  
2 configuration data is adapted to simultaneously load a one bit of configuration data into each of  
3 the configuration blocks.

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1                   10.   (Original)   A method for loading configuration data for a configuration  
2 word comprised of a plurality of configuration blocks into a programmable device, the method  
3 comprising:

4                   receiving a command word via a plurality of command inputs designating a first  
5 subset of the plurality of configuration blocks;

6                   receiving a data word comprising a portion of the configuration data for  
7 configuration word via a plurality of configuration inputs; and

8                   simultaneously loading the data word into each one of the subset of configuration  
9 blocks designated by the command word.

1                   11.   (Original)   The method of claim 10, wherein the steps of receiving the  
2 command word, receiving the data word, and loading the data word are repeated for a second  
3 data word and a second command word designating a second subset of the plurality of  
4 configuration blocks.

1                   12.   (Original)   The method of claim 11, wherein the second subset of the  
2 plurality of configuration blocks does not intersect the first subset of the plurality of  
3 configuration blocks.

1                   13.   (Original)   The method of claim 10, wherein the command word  
2 comprises a plurality of command bits, such that each command bit is associated with one of the  
3 plurality of configuration blocks.

1                   14.   (Original)   The method of claim 10, wherein at least one configuration  
2 block in the first subset of the plurality of configuration blocks comprises a plurality of bits equal  
3 in number to the number of configuration inputs.

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1                   15.   (Original)    The method of claim 10, further comprising:  
2                   loading configuration data from the plurality of configuration blocks into a  
3 memory location in a configuration memory.

1                   16.   (Original)    The method of claim 10, further comprising:  
2                   receiving a configuration mode via a configuration mode input;  
3                   enabling the first subset of the plurality of configuration blocks to simultaneously  
4 load configuration data via the plurality of configuration inputs in response to a first state of the  
5 configuration mode; and  
6                   loading configuration data into the plurality of configuration blocks via an  
7 alternate communication means in response to a second state of the configuration mode.

1                   17.   (Original)    The method of claim 16, wherein the alternate  
2 communication means is via the plurality of configuration inputs.

1                   18.   (Original)    The method of claim 16, wherein the alternate  
2 communication means is via the plurality of command inputs.

1                   19.   (Original)    The method of claim 16, wherein loading configuration  
2 data into the plurality of configuration blocks comprises:  
3                   simultaneously loading one bit of configuration data into each of the plurality of  
4 configuration blocks.

1                   20.   (Original)    The method of claim 10, further comprising:  
2                   testing the programmable device loaded with the configuration data.

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1                   21.     (Currently Amended) The method of claim 20, further comprising:  
2                   repeating with a second set of configuration data the steps of receiving a second  
3     command word, receiving a second data word, loading the second data word, and testing in order  
4     to test the programmable device loaded with the second set of configuration data.

1                   22.     (Currently Amended) A system having a plurality of devices, the system  
2     comprising:  
3                   a programmable device including:  
4                   a configuration word register comprising a plurality of configuration blocks,  
5                   a plurality of configuration inputs ~~selectively~~ coupled with each of the plurality of  
6     configuration blocks and adapted to communicate configuration data, and  
7                   a plurality of command inputs adapted to independently enable at least one of the  
8     plurality of configuration blocks, wherein the plurality of configuration blocks are adapted to  
9     simultaneously load configuration data via the plurality of configuration inputs in response to the  
10    plurality of command inputs; and  
11                  an interface for connecting the programmable device with a configuration data  
12    source.

1                   23.     (Original)     The system of claim 21, further including:  
2                   a configuration source having a set of configuration data and adapted to  
3     communicate the set of configuration data with the programmable device.

1                   24.     (Original)     The system of claim 23, wherein the configuration source  
2     includes a plurality of different sets of configuration data and is adapted to test the  
3     programmable device by successively communicating each of the plurality of different sets of  
4     configuration data with the programmable device.